

WHAT IS CLAIMED IS:

1. A drive unit for an elevator comprising:
a pair of spaced apart bearing end-plates mounted on a machine frame, each of
5 said bearing end-plates retaining an associated bearing;
a pair of electric motors, each said motor supported by an associated one of said
bearing end-plates;
a shaft having opposed free ends, said shaft being rotatably supported by said
bearings, each of said free ends of said shaft being drivingly connected to
10 an associated one of said motors; and
a traction sheave supported by said shaft for rotation by said motors.
2. The drive unit according to claim 1 wherein each of said motors has a rotor
arranged on said associated free-end of said shaft and a stator mounted on said associated
15 bearing end-plate by an associated cage-housing.
3. The drive unit according to claim 1 including at least one brake disk attached
to said traction sheave and at least one disk brake acting on said at least one brake disk.
- 20 4. The drive unit according to claim 1 wherein said motors are connected to a
plurality of frequency converters operating in a master/slave mode.
5. The drive unit according to claim 4 wherein one of said frequency converters
is a master frequency converter that specifies a total current distributed among said
25 frequency converters, and each of said frequency converters includes a current regulator
for regulating a current based upon a reference current value and an actual current value.
6. The drive unit according to claim 4 including at least one bus system
connecting said frequency converters for communicating at least one of reference-current
30 signals, synchronization signals and identification signals.

7. The drive unit according to claim 4 including a tachogenerator coupled to said shaft and connected to said frequency converters for generating a signal representing an actual rotational speed of said shaft.

5 8. The drive unit according to claim 1 including a secondary-sheave mounting attached to said machine frame and a secondary sheave rotatably mounted on said secondary-sheave mounting.

9. A drive unit for an elevator comprising:
10 a pair of spaced apart bearing end-plates mounted on a machine frame, each of said bearing end-plates retaining an associated bearing;
a pair of electric motors, each said motor supported by an associated one of said bearing end-plates;
a shaft having opposed free ends, said shaft being rotatably supported by said
15 bearings, each of said free ends of said shaft being drivingly connected to an associated one of said motors;
a traction sheave supported by said shaft for rotation by said motors; and
a plurality of frequency converters connected to said motors and operating in a master/slave mode.

20 10. The drive unit according to claim 9 wherein one of said frequency converters is a master frequency converter that specifies a total current distributed among said frequency converters, and each of said frequency converters includes a current regulator for regulating a current based upon a reference current value and an actual current value
25 for said associated motor.

11. The drive unit according to claim 9 including at least one bus system connecting said frequency converters for communicating at least one of reference-current signals, synchronization signals and identification signals.

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12. The drive unit according to claim 9 including a control connected to a one of said frequency converters operating as a master frequency converter, said control generating a signal representing a reference rotational speed of said shaft, and a tachogenerator coupled to said shaft and connected to said control for generating a signal
5 representing an actual rotational speed of said shaft.

13. The drive unit according to claim 12 wherein said master frequency converter generates said reference current value.

10 14. The drive unit according to claim 9 including a secondary-sheave mounting attached to said machine frame and a secondary sheave rotatably mounted on said secondary-sheave mounting.